ANNEX A

TO THE

COMMERCIAL SPACE OPERATIONS SUPPORT AGREEMENT BETWEEN

THE 45TH SPACE WING, PATRICK AFB FLORIDA

AND

XXXXXXXXXXXXXXXXXXXX

Table of Contents

1. In	ntroduction	3
2. Sı	upport Requirements	3
a.	Program Planning Process	
b.	Facilities/Real Property	5
C.	Fire Protection	7
d.	Environmental	8
e.	Safety	10
f.	Radiation Protection	13
g.	Mission Processing and Launch Operations Support	13
h.	Ordnance Storage	16
i.	Communications/Data	16
j.	Security	19
k.	Logistics	20
I.	Financial	21
m.	International Affairs	21
n.	Antiterrorism	22
0.	Weather	24
p.	Other	25
3. D	ocument Administration	26
4. Aı	nnex A Approval	26
Abbr	reviation & Acronym List	27

XXXXXXXXXXXXXX Annex A to the Commercial Space Operations Support Agreement

1. Introduction

- a. This annex defines support by the 45th Space Wing (45 SW) to XXXXXXXXX or "User" for launch programs under the Commercial Space Operations Support Agreement (CSOSA). This annex exists in conjunction with the CSOSA and is a subsidiary document to the CSOSA. It describes the roles and responsibilities between the 45 SW and the User in support of commercial launch-related operations in accordance with AFSPCI 10-1215.
- b. The 45 SW Commander (45 SW/CC), Patrick Air Force Base (PAFB), is the authorized representative for executing and amending this annex on behalf of the Air Force. Except as otherwise specifically provided, any reference in the annex to "Commander" shall include his or her authorized representatives and duly appointed successors.

For XXXXXXXXXXXXX, the key User interfaces at the 45 SW consist of the Wing Planning Engineer (WPE), Launch Site Integration Manager (LSIM), Program Support Manager (PSM) and Job Order Manager (JOM). The primary objective of these lead wing interfaces is to ensure efficient and effective spacecraft, or space vehicle (SV), and launch vehicle (LV) processing; 45 SW asset and range utilization; and accurate cost accounting. During the planning phase through Statement of Capability (SC), the WPE is the 45 SW team lead and is the User's primary interface. Upon completion of the SC, the LSIM becomes the overall primary User interface. The 1 ROPS will be the User's primary interface for range and financial support as well as accountability throughout all phases of a launch campaign. The JOM provides funding support and accountability throughout all phases of a launch campaign.

For certain items identified as 45 SW responsibilities, the Commander may delegate the responsibilities to base support contractors. These contractors may be asked to sign Associate Contractor Agreements with the User, if necessary.

2. Support Requirements

- a. Program Planning Process
 - (1) The 45 SW will:
- (a) Respond to formal requests for use of Air Force assets, validate User requirements and interpret Air Force policies concerning use of Air Force assets.
- (b) Support the User during their Range entry planning phase to determine if the 45 SW can support the User's program.

- (c) Wing support shall be in accordance with AFSPCI 10-1215. The 45 SW will designate a WPE as the User's primary Point of Contact (POC) during the initial planning phase to make the User's requirements known within the 45 SW, facilitate streamlined throughput of 45 SW processes, and identify and facilitate access to resources required for the User's operations. The 45 SW will ensure the User is aware of all applicable Air Force guidance and policies. Upon completion of the SC, the LSIM becomes the overall primary User interface. The 1 ROPS will be the User's primary interface for range and financial support as well as accountability throughout all phases of a launch campaign. The JOM provides funding support and accountability throughout all phases of a launch campaign.
- (d) Assist the User with the processing of their initial requirements into a Program Introduction (PI) that will be an input into the Universal Documentation System (UDS). Staff the PI with the Eastern Range (ER) functional offices and prepare a SC, as applicable. Provide the User 45th Space Wing Instruction (45 SWI) 99-101 45 SW Mission Program Documents and the UDS Handbook (Range Commander's Council Document 501-97).

NOTE: Prior to preparation and/or submission of any requirements/UDS documents it is recommended the User contact the WPE, PSM and/or the LSIM to ensure requirements get submitted in the proper format. Future changes to the Range architecture may require modifications to the Range UDS process.

- (e) Coordinate the expected costs to support the initial planning phase of the User's program with the User in advance. Provide initial cost estimates, through the UDS, for services to be provided to the User based on 45 SW-accepted User planning documents.
- (f) As necessary, establish CSOSA Annex Appendices, or other agreements, that delineate the responsibilities of the 45 SW, the User, and other responsible organizations for shared facilities, equipment and services; and as necessary, establish appropriate appendices or agreements that delineate the responsibilities of the 45 SW and the User with respect to 45 SW infrastructure, systems, facilities, and equipment that are outside or within the User's assigned and properly documented areas.
- (g) Facilitate support as requested in accordance with Appendix B, Range Support Policy.

(2) The User will:

(a) Identify all known requirements relating to long-lead items, including facility siting, environmental impact analysis, classified operations and communications infrastructure changes, before submission of a PI. The 45 SW encourages technical interchanges between the User and the 45 SW to take place as early as possible in the planning phase.

(b) Use the UDS to identify program support requirements to the 45 SW.

NOTE: Users are encouraged to identify all support requirements regardless of the intended source of the support to ensure delivery of authorized 45 SW support, identification of derivative Range requirements that may exist, and to help avoid conflicts/delays in Range operations.

(c) Provide funding for support services to the JOM in accordance with provisions of the CSOSA. Support rendered under the terms of this annex will correspond with a Job Order Number (JON) funded by the User and managed by a JOM. The WPE will act as the JOM in the initial planning phase. Once the SC is published, a JOM will be assigned to work directly with the LSIM and PSM through the remainder of the program. The User will agree to charges to their JON for analysis completed by 45 SW civilian and contractor personnel during the conceptual phase (prior to submission of a PI), UDS planning and operational phases.

b. Facilities/Real Property

(1) The 45 SW will:

- (a) Perform, review and approve/disapprove, as appropriate, non-explosive facility siting, construction, modifications, inspections, digging, demolitions, facilities excellence compliance, fire compliance, environmental impact, utility and infrastructure impact, and real property management.
- (b) Provide maintenance and repair of Air Force facilities shared between Air Force and commercial programs as specified in the User's Real Property Agreement.
- (c) Evaluate User-submitted Air Force (AF) Forms 332, Base Engineer Work Request, and AF Forms 103, Base Civil Engineering Work Clearance, per Air Force Instruction (AFI) 32-1001, Operations Management, and respond in a timely manner.
- (d) Develop real property leases and licenses for use of Air Force real property to be assigned to the User and process renewals, terminations, and modifications, as necessary. The 45 SW will lease/license real property at Cape Canaveral Air Force Station (CCAFS) to commercial operators in accordance with all applicable guidance, including the provisions of 10 USC §2667 (Leases: Non-Excess Property of Military Departments), AFI 32-9003 *Granting Temporary Use of Real Property*, and pertinent Secretary of the Air Force (SAF) and Department of Defense (DoD) policies. The 45 SW will only consider lease or license approval if 32 CFR 989, *Environmental Impact Analysis Process* (EIAP) and AFI 32-7066, *Environmental Baseline Survey* (EBS) or a waiver are complete.
- (e) Process temporary right-of-entry requests for use of Air Force property, as required.

- (f) Identify and make available to the User real property and Real Property Installed Equipment (RPIE) in Air Force facilities, or RPIE attached to the User's leased or licensed facilities, as listed on Air Force property records.
- (g) Provide access to utilities such as potable water, electricity, natural gas and wastewater services when requested by the User.
- (h) Provide an *Explosive Ordnance Disposal (EOD) Response Guide* to the User's technical data package. The EOD actions support the protection of personnel, property and mission capability of CCAFS and the 45 SW.
- (i) Coordinate with the User any power outages affecting the User's leased or licensed facilities.
- (j) Identify any RPIE with energy savings contract commitments prior to User's use of such equipment and also identify the required reimbursements involved.

- (a) Submit an AF Form 332 and a letter of commercial non-availability for facility, space or land use to the WPE. The User should begin the facility siting process early to avoid unnecessary delays in obtaining rights-of-entry.
- (b) Submit an AF Form 332 to the 45th Civil Engineer Squadron (45 CES) for any construction or modifications by the User to real property. Submit design and construction plans to the 45 SW at least 90 days prior to the scheduled start of such work to ensure enough time to incorporate any necessary changes before the start of construction.
- (c) Submit an AF Form 103 to the 45 SW before beginning any digging, demolition, new construction or modifications. The 45 SW has 30 days from the submittal date to approve/disapprove the request, except for explosives facility siting which may take up to a year and is processed by 45 SW Safety Office (45 SW/SE). This review time does not include the time required to complete the EIAP, which is required for approval/disapproval. Major projects must adhere to a standard 30/60/90% design review process. The User must obtain approval from the 45 SW before work can start. Upon completion of construction or modifications, the User shall provide 45 CES as-built drawings and DD Form 1354, *Real Property Capitalization*, per AFI 32-9005, *Real Property Accountability and Reporting*, within 45 days of work completion. The 45 SW requires documentation from the User including; siting requests, plans, specifications and as-built drawings, unless specifically waived in writing. The User shall execute digging operations only on non-Launch Critical Days, unless a specific waiver has been granted, in accordance with 45 SWI 32-1006.
- (d) Conduct operations in accordance with the requirements of the Air Force real property lease/license assigned to the User. Comply with applicable rules and directives regarding the facilities/real property.

- (e) Notify the WPE, LSIM or appropriate 45 SW organizations of any changes in requirements for use of Air Force real property or assigned equipment.
- (f) Support the Facilities Manager's Program, per Attachment 3 to AFPAM 32-1004 Volume 3. The User will support the program using commercially-accepted building codes/practices and facility designs.
- (g) Request desired utilities and execute a Utility Sales Agreement. The 45 SW may require the User to install meters and upgrade existing Air Force utility systems to support the User's needs and Air Force conservation initiatives. The User will obtain all permits associated with these upgrade efforts.
- (h) Provide an EOD Data Package with technical data on each commercial launch vehicle to 45 SW Explosive Ordnance Disposal Detachment (45 CES/CED) and 45 SW Safety Analysis Office (45 SW/SEA) as outlined in Appendix A to this annex. The User is responsible for coordinating the package with 45 CES/CED and 45 SW/SEA. The User must provide this information prior to component delivery and in sufficient time to allow 45 CES/CED to develop a Response Guide. The User shall provide technical data, access to the vehicle for Response Guide validation and a representative familiar with the vehicle and the data package to assist in the validation. The EOD Data Package will include 8x10-inch color photographs of all ordnance items installed on launch vehicles.
- (i) Provide immediate notification to 45 CES, 45 SW/SE and 45 CONS/LGCZ of any damage to United States (US) Government property.
- (j) Comply with USAF, AFSPC and 45 SW Facilities Excellence and sign standards on all exterior work on occupied facilities or areas and comply with the standards for facility interiors or, upon vacating any assigned facilities, return interiors to the state they were originally supplied to the commercial entity at no cost to the government.

c. Fire Protection

- (1) The 45 SW will:
- (a) Determine whether fire protection systems and services for the User's facilities on CCAFS are in compliance with Air Force instructions.
 - (b) Provide fire/medical services for emergency situations.
 - (c) Provide initial emergency spill response.
 - (2) The User will:
- (a) Comply with fire prevention and protection provisions of 45 SWI 32-2001, *Fire and Emergency Services Program*, for any work to be performed at CCAFS.

- (b) Provide spill response in accordance with environmental laws and 45 SW CCAFS Comprehensive Emergency Management Plan (CEMP) 10-2, Vol I.
- (c) Provide facility access to 45 SW CCAFS fire protection personnel (may be contractor) to perform fire prevention inspections.

d. Environmental

(1) The 45 SW will:

- (a) Administer the EIAP. The EIAP includes responsibility for compliance with all applicable federal, state, and local environmental laws, regulations, procedures and permit conditions including, but not limited to: the Endangered Species Act; Sikes Act; Coast Zone Management Act; Marine Mammal Protection Act; National Historic Preservation Act; Archaeological Resources Protection Act; and the Native American Graves Protection and Repatriation Act.
- (b) Provide access to existing environmental data for User-designated areas of interest.
- (c) Evaluate each AF Form 813, *Request for Environmental Impact Analysis*, submitted by the User and provide a written response to the User in a timely manner.
- (d) Include the User's environmental coordinator in all applicable informal consultations (including, but not limited to, endangered species, historic or archeological sites, etc.), meetings and processes.

(2) The User will:

- (a) Comply with the EIAP as defined in 32 CFR 989.
- 1. Submit an AF Form 332, a 45 SW Environmental Checklist, and an AF Form 813, when required, to 45 CES prior to executing any project, modification or real estate/real property lease or license request(s).

2. Submit an AF Form 813 for:

- (a) Any proposed action that requires US Government approval/disapproval under the provisions of the User's lease, license or CSOSA;
- (b) Any new actions not already covered by EIAP or subsequent National Environmental Policy Act (NEPA) analysis by the Air Force; or
- (c) Any new payload, launch vehicle, new construction, or modifications. The User will provide the necessary NEPA documents, as required by 45 CES/CEA.

- 3. Notify 45 CES/CEAO of any new payloads at least 1 year prior to delivery to CCAFS.
- 4. Submit AF Forms 332 and 813 at the earliest planning stages of an action to allow for the necessary time needed to complete the environmental analysis. Comply with the environmental guidance and recommendations recorded on AF Forms 332, 813 or NEPA documentation.
- (b) Provide a technical POC to interface with regulatory agencies and the public. The User will coordinate with the Air Force prior to requesting approval/disapproval from regulatory agencies for all new, modified or decommissioned pollution sources or regulated activities on the installation. The User will notify 45 CES/CEA promptly of any regulatory visits, inspections and/or requests for information.
- (c) Submit for Air Force review any EBS, Clean Air Act General Conformity Determinations or applicable waivers for real estate/real property activities. Upon termination of the use of Air Force real property, the 45 SW will require the User to perform an exit EBS to determine the extent of any environmental damage caused by the User, unless otherwise stated in the User's real property agreement. Before beginning the EBS or Applicability Analysis, the Air Force and the User will agree, in writing, on the scope and implementation of the project. The User shall request any waivers in writing. The User shall submit a final report for Air Force review and final approval/ disapproval when each undertaking (EBS, Clean Air Act General Conformity Determination or waiver) is completed.
- (d) The User will be invited to participate in the regulatory process for monitoring and reporting of threatened or endangered species, marine mammals or noise abatement attributable to the User's operations on its leased/licensed real property, where required by law and/or regulatory agency authority. Because there may be environmental mitigation and monitoring implications that pre-date/transcend the User's use of leased/licensed property, the User's liability for mitigation and monitoring is based upon clear and unencumbered association with the User's activities/operations.
- (e) Collect, contain and manage all hazardous wastes generated by the User. The User must manage and dispose of hazardous waste under the User's assigned Environmental Protection Agency (EPA) ID number for the User's leased or licensed property.
 - (f) Comply with 45 SWI 32-7001, Exterior Lighting Management.
- (g) The User will be permitted to participate in Section 7 consultation conducted between the US Fish and Wildlife Service and the Air Force.
- (h) Provide information relevant to the assessment of the effect of an undertaking on actual or eligible historic structures or sites as requested by the Air

Force. The User can participate in the Section 106 process as defined in 36 CFR 800, *Protection of Historic Properties*, Sections 800.2(c)(5) and 800.6(a)(2).

e. Safety

(1) The 45 SW will:

- (a) Establish, direct and enforce the 45 SW Safety Program as defined in the applicable tailored (T) Range Safety Requirements document (Eastern Western Range (EWR) 127-1, AFSPCMAN 91-710, etc.). Support and approve/disapprove tailoring of the applicable EWR Safety Requirements (EWR 127-1 or AFSPCMAN 91-710 based on UDS PI date), as requested by the User. Establish, direct and enforce the 45 SW Safety Program as defined in the applicable tailored Range Safety Requirements, AFI 91-217 Space Safety and Mishap Prevention Program, etc.
- (b) Assist in the development and review of, and act as coordinator to appropriate agencies for approval/disapproval of, all Explosive Site Plans (ESPs) and Licenses.
- (c) Participate in design reviews of launch vehicle systems, including Flight Safety System (FSS), facilities and Ground Support Equipment (GSE), as required. Approve/disapprove all hazardous and safety critical items (e.g., procedures and Operations & Support Hazard Analyses [O&SHAs]) prior to use, as defined in the applicable (T) Range Safety Requirements document.
- (d) Review and coordinate new construction and modification plans for safety considerations, hazardous and safety-critical systems, and line-of-sight for radar and command destruct.
- (e) Review, coordinate, approve/disapprove and monitor, as deemed necessary by 45SW/SE, all hazardous and safety critical operations posing a potential safety risk as defined in the applicable (T) Range Safety Requirements document. If 45 SW/CC approves the User as the Launch Complex Control Authority, 45 SW/SE shall audit the User's safety program on a periodic basis and, if circumstances warrant, recommend that 45 SW/CC decertify the User's safety program.
- (f) Establish and publish directives and procedures to assure public safety. Advise and consult with the User concerning changes to safety requirements that might affect the User's programs.
- (g) Evaluate each request for a waiver or deviation of safety requirements contained in the applicable (T) Range Safety Requirements document based on equivalent level of safety, program impact and probable risks to life and/or property. Inform the User promptly of approval/disapproval of waiver or deviation requests.
- (h) Investigate all accidents or incidents involving Air Force personnel or property, in accordance with applicable AFIs. Monitor the User's accidents and

incidents as part of a recurring evaluation of the User's Launch Complex Operations Safety Program. Accompany any Occupational Safety and Health Administration (OSHA) representative at all times while on the User's leased or licensed property located on CCAFS.

- (i) Provide safety engineering and develop processes to mitigate risks involved in pre-launch and launch operations.
- (j) Review and approve/disapprove the User's safety deliverables, as required in the applicable Tailored (T) Range Safety Requirements document.
 - (k) Approve/disapprove all launch vehicles and payload flight plans.
 - (I) Establish mission rules.
 - (m) Determine criteria for flight termination action to protect the public.
 - (n) Enforce Safety Collision Avoidance (COLA) requirements.
- (o) Operate, maintain, upgrade and approve/disapprove toxic dispersion, distant focusing overpressure and debris risk mitigation programs.
- (p) Based on hazards associated with a launch vehicle, perform analyses to ensure risk mitigation for safety of personnel and protection of resources. Distinguish between launch complex, launch area and public.
- (q) Coordinate with the 45th Weather Squadron (45 WS) and Brevard County Emergency Management for weather monitoring and forecasts.
- (r) Ensure the User's Process Safety Management Plan is properly integrated into the 45 SW plan.
 - (2) The User will:
 - (a) Implement and coordinate its activities with the 45 SW.
- (b) Recognize the right of 45 SW to monitor the User's Launch Complex Operations Safety Program. Comply with established safety requirements and procedures. Provide 45 SW safety personnel and support contractors' access to User facilities.
- (c) Formally request, with full explanation and justification, waivers or deviations from safety requirements contained in the applicable (T) Range Safety Requirements document. EWR 127-1, Chapter 1, Paragraph 1.6.5 and Appendix 1C and AFSPCMAN 91-710, Volume 1, Section 4.6 and Attachment 3, contain guidance on the process for waivers, deviations and other non-compliances.

- (d) Investigate explosive and/or industrial accidents/incidents involving the User's personnel or resources and request assistance from 45 SW, as necessary. Coordinate and participate in joint investigations where Air Force and the User's resources are involved. Notify the 45 SW of all accidents/incidents as soon as possible, but no later than 24 hours after the accident/incident, and provide copies of reports upon request. Notify 45 SW/SEG in the event of an OSHA investigation or visit by OSHA representatives. Permit a representative from 45 SW/SEG to accompany the OSHA inspector on the User's leased or licensed property located on CCAFS. If assigned ownership for space mishap investigation, provide provisions for the AF to participate and/or observe proceedings IAW Space Safety Mishap Prevention Program.
- (e) Coordinate and participate in ER safety investigations and expediently support all requests for information and other assistance.
- (f) Perform safety inspection of all facilities on CCAFS property using a qualified safety inspector to assess compliance with OSHA.
- (g) Submit all new, hazardous and safety-critical procedures to 45 SW for review and approval/disapproval, in accordance with the applicable (T) Range Safety Requirements document (EWR 127-1, Chapter 6, or AFSPCMAN 91-710, Volume 6). The 45 SW will be the approving authority for hazardous and safety-critical operating procedures. The User will coordinate all scheduling of hazardous operations in accordance with the applicable sections of the (T) Range Safety Requirements document (EWR 127-1 (T), Chapter 6, or AFSPCMAN 91-710, Volume 6) and this annex.
- (h) Comply with the requirements and provisions of the applicable (T) Range Safety Requirements document as well as applicable OSHA, Federal Aviation Administration (FAA), other DoD, Air Force, federal and state regulations.
- (i) Provide immediate notification to 45 SW of any injury to Air Force personnel or to any member of the public. The User will ensure that members of the public are outside of the safety clear zone for all hazardous operations, as defined in the applicable (T) Range Safety Requirements document and the hazardous procedure in use. The User will ensure that members of the public are not within the boundaries of a user's facility when propellants/explosives are present. Prior to any visitors entering hazardous locations, a risk assessment must be prepared by the User and accepted by 45 SW Safety.
- (j) Provide notification to 45 SW of any FSS testing failures and involve 45 SW/SE in the anomaly resolution processes prior to any configuration changes in accordance with the applicable Range Safety Requirements document (EWR 127-1, Chapter 4 or AFSPCMAN 91-710, Volume 4 or Range Commander's Council (RCC)-319.
- (k) Notify 45 SW, in writing, that the User is in compliance with the requirements of 29 CFR 1910.119, *Process Safety Management* and, as applicable, the requirements of 40 CFR 68, *Risk Management Program*.

- (I) Provide 45 SW with safety data on all new or modified hazardous or safety critical systems, including the FSS and software, facilities and GSE, as required by the applicable (T) Range Safety Requirements document. The User will not use new or modified hazardous or safety critical hardware/software without 45 SW/SE approval.
- (m) Provide 45 SW with vehicle, facility, hazardous commodities and ground support equipment data to support ESP development.
- (n) Provide for the recovery of all land-impact debris and any water-impact debris that presents a hazard to mariners or that has been proven to cause measurable and permanent adverse impacts to marine life or the environment. The User and the Air Force will jointly determine the scope of debris recovery and disposition efforts on a case-by-case basis, however, the 45 SW shall not require the User to conduct any deep-water recovery of debris.
- (o) Provide an adequate means of egress from all facilities and an adequate means of access to all facilities for emergency support personnel. Prior to launch, all vehicles, tankers, trailers, portable GSE and other non-launch essential equipment must be relocated outside the Flight Hazard Area unless an exception is obtained per the Commander's Vehicle Parking within the Vehicle Clear Contour Philosophy letter.
 - (p) Comply with the CEMP 10-2, Volumes I and II.
- (q) Comply with 45 SWI 91-204, Launch Vehicle Toxic Plume/Distant Focusing Overpressure Instructions for On-Base Personnel.
 - (r) Comply with 45 SWI 91-206, Danger Area Information Plan.

f. Radiation Protection

- (1) The 45 SW will evaluate radiation use requests submitted by the User, in accordance with the provisions of 45 SWI 40-201, *Radiation Protection Program*.
- (2) The User will submit requests for Radiation Use Authorization (RUA), as provided for in 45 SWI 40-201, prior to bringing any radioactive materials on site, or operating any source of x-ray, radio frequency, or laser radiation. The User must request and obtain approval for modification of the RUA prior to adding any new radiation emitting equipment, changing work locations or making any other changes to procedures or limitations outlined in the RUA.
 - g. Mission Processing and Launch Operations Support
 - (1) The 45 SW will:
- (a) Make available ER data and frequency management data as described in the User's UDS documentation.

- (b) The 45th Launch Group in accordance with AFSPCI 10-1215 shall designate a LSIM who will serve as the User's primary interface for SV and LV processing and SV facility requirements. The LSIM provides and coordinates mission planning, ER and wing operational support planning, and interacts with the WPE and PSM during the PI phase and is the User's primary SV and LV processing interface after issuance of the SC. The LSIM ensures User's questions are answered and requirements are met in a timely manner, provides the User efficient and effective options for utilizing 45 SW and supporting commercial processing facility utilization, and monitors planning and execution of User activities to include site activation, flight hardware receipt, vehicle processing and launch activities. In addition, the LSIM performs SV and LV mission assurance as requested by the User, and performs risk-based assessments of vehicle processing activities and launch readiness to both the User and 45 SW leadership including potential impacts to 45 SW facilities and infrastructure.
- (c) The 45th Operations Group, in accordance with AFSPCI 10-1215, shall designate a PSM who will serve as the User's primary interface for Range requirements. The PSM participates in mission planning, oversees ER and operational support planning for range requirements, and interacts with WPE and LSIM during the PI Phase. The 1 ROPS will manage and facilitate the User through the UDS process, to include User training and assistance. The 1 ROPS ensures User requirements accurately translate into UDS requirements, ensures the User develops an effective and executable schedule, de-conflicts range operations with other 45 SW users, ensures proper scheduling of processing and launch range activities, coordinates the employment of Range instrumentation and facilities, and coordinates the acquisition, modifications and deployment of Range systems in support of User requirements.
- (d) The 45th Operations Group, in accordance with AFSPCI 10-1215, shall designate a JOM to manage the User's JONs and serve as the User's initial and primary POC for all cost/funding information and resolution of questionable charges. Using established procedures, the JOM is responsible for preparing and coordinating cost estimates. The JOM will provide cost estimates to the User no later than 30 working days after submission of initial requirements and coordinate any delays in providing the cost estimates with the User. The JOM will obtain the User's approval/disapproval for establishing JONs funded by the User and for authorizing travel charged to the User. The JOM and the User shall work together to identify funds deficit projections for on-going tasks to help the User control its activities, based upon the availability of funds.
- (e) Provide ER scheduling and launch manifest coordination/services in accordance with Program Requirements Documents (PRDs), Air Force Space Command (AFSPC) procedures and the instructions listed below. The scheduling of the User's operation reserves and obligates ER resources to support the operation.
- <u>1</u>. AFSPC Instruction (AFSPCI) 10-1213, *Spacelift Launch Strategies and Scheduling Procedures.*

14

- <u>2</u>. AFSPCI 10-1215, Support To FAA-Licensed Space Launch Activities.
 - 3. 45 SWI 13-206, Eastern Range Scheduling.
- (f) Provide meteorological support in accordance with applicable PRDs or other approved documentation.
- (g) Provide operations support planning and management. The PSM is responsible for the identification and resolution of the User's ER support requirements, coordinates operations and assists the JOM.
- (h) Provide ER operations control. The Range Control Officer (RCO) is the Air Force individual responsible for exercising ER operations control. The RCO is responsible for and has the authority to control the conduct of, and maintain the discipline in the accomplishment of approved ER activities (launch and other operations, including prelaunch operations). In addition, operations control may require that an activity be stopped to meet safety and technical requirements, to avoid interference with other operations, to prevent undue expenditure of resources and to adjust to resource limitations.
- (i) Provide Mission Flight Control Officers (MFCOs) and MFCO-related support services.
- (j) Manage and allocate ER Special-Use Airspace, including coordination for the use of additional airspace to support ER operations.
- (k) Assist the JOM in resolving questionable charges, if required. If the User challenges questionable charges, the JOM and the Comptroller will provide additional details, to include the rationale for the charges, within 10 days. If the charges were in error, the JOM and the Comptroller will coordinate with appropriate organizations to apply credit for next billing month. The User will be billed for labor hours consumed in researching disputed charges found to be valid.

- (a) Use the appropriate 45 SW interfaces for Mission Processing and Launch Operations Support and provide insight into their use of 45 SW SV and LV facilities. Doing so enhances the 45 SW's ability to support the Users efficient, cost-effective and responsive utilization of 45 SW assets, facilities and personnel.
- (b) Participate in scheduling meetings and provide the 45 SW with requested dates for the User's operations. The 45 SW shall have the right to approve/disapprove the launch date in accordance with established ER scheduling practices and national interests.

- (c) Coordinate authorized use of 45 SW active Special-Use Airspace and obtain prior permission for the use of the airfield facility at CCAFS with the 1 ROPS. The User shall obtain the Prior Permission Required (PPR) not later than 1200 local time the day prior to the requested date. In addition, the User must comply with AFI 10-1001, *Civil Aircraft Landing Permits*, and AFI 10-1002, *Agreements for Civil Aircraft Use of Air Force Airfields*. Civil aircraft landing fees apply.
- (d) Participate in the 45 SW Knowledge Management Initiatives (KMI). KMI is designed to benefit all stakeholders by establishing an information exchange which will increase sharing, integration and delivery of useful information within the community involved in range and space launch operations.
- (e) Provide adequate technical insight to enable government understanding of evolving launch systems.
- (f) Perform robust and acceptable flight worthiness certification process. Provide wing commander with a sufficient level of confidence that launch vehicle performance presents an acceptable risk to public safety and launch base infrastructure and security. This level of confidence for commercial launches can be achieved through approval/disapproval of user's flight worthiness processes and any changes to those processes. Provide the wing commander with User's flight worthiness certification during the commander's Launch Readiness Review.

h. Ordnance Storage

- (1) The 45 SW will:
- (a) Provide User with the terms and conditions for ordnance storage at CCAFS and document these terms and conditions in a Courtesy Storage Agreement (CSA).
 - (2) The User will:
 - (a) Sign a CSA with 45 LCSS prior to storing any ordnance on CCAFS.
 - (b) Comply with the provisions agreed to in the CSA.

i. Communications/Data

- (1) The 45 SW will:
- (a) Provide technical guidance and support for obtaining or interfacing with data transfer systems including safety (countdown, missile lift-off, telemetry, metric, voice and video display systems) and interfacing with general base support communications services (telephone, security, fire, etc.).

- (b) Provide cross-connects and patching as required for mission data transfer circuits.
 - (c) Meet User's requirements with excess capacity when available.
- (d) Provide Rough Order of Magnitude (ROM) cost and schedule estimates for engineering and technical support.
- (e) Provide detailed interface requirements to support the User in generating the Interface Control Document (ICD).
- (f) Repair/restore service and provide trouble-reporting support for outages.
- (g) Provide performance evaluation and reliability information on systems, as requested.
- (h) Provide frequency support and authorizations for the use of frequencies not controlled by the Federal Communications Commission (FCC).
- (i) Establish points of demarcation for the User's interface to 45 SW communications in leased or licensed facilities. The 45 SW may provide base communications (i.e., telephone and LAN access) on a reimbursable basis for leased or licensed facilities.
- (j) Evaluate the User's requests for installation of commercial communications systems for use on commercial launch operations on a non-interference basis.
- (k) Coordinate with the User any communications outages affecting the User's leased or licensed facilities.

- (a) Request all ER communications support requirements, including voice, data, frequencies, video and electronic imaging support through the UDS or other 45 SW requirements processes. The User should attempt to outline communications requirements early in the program, since implementation may require extensive lead-time.
- (b) Comply with Information Assurance policy and guidance if communications-computer infrastructure is utilized within the 45 SW. The User's equipment installed in or interfacing with ER facilities must only process/contain unclassified information.

- (c) Comply with applicable 45 SW, Air Force, DoD, and US Government regulations including 45 SWI 99-102, *Test, Evaluation, Documentation, and Operational Acceptance of Eastern Range Systems*.
 - (d) Comply with 45 SWIs for asset and facility requirements/access:
- 1. The ICD, signed by the User program manager and 45th Range Management Squadron (45 RMS), will be the official technical document used to control the ER-User interface. In the ICD, the User must identify its interface requirements, system specifications and any equipment to be procured by the Air Force (cable, patch panels, cabinets, etc.). The User must notify the Air Force of all required equipment procurements at least 210 days prior to first required use of the system. The User may supply the equipment if approved by the 45 SW. User-supplied equipment must meet 45 SW standards and be delivered at least 45 days before the first required use. The 45 SW will process any changes to the ICD requested by the User. The 45 SW requires a detailed analysis showing that the User's equipment meets all federal, military and ER standards prior to authorization of its use with/in ER assets/facilities.
- 2. The Eastern Range Technical Services (ERTS) performs technical interface work for 45 RMS-controlled facilities and equipment locations. For the User's equipment in these areas, the ERTS will only provide connections as defined in the ICD after the User has installed its equipment on the other side of the interface. The 45 SW provides ERTS cost information to the User for obtaining these services. The 45 SW will not allow the User to perform circuit cross-connects and/or cabling in ER operational areas.
- 3. The User is solely responsible for the Operation and Maintenance (O&M) of its equipment installed in ER areas. This responsibility includes obtaining the necessary clearance and badge paperwork for unescorted entry (if required), ensuring the proper test equipment is available, ensuring the system is engineered and tested correctly, ensuring all safety requirements are satisfied (including Seismic Zone 4), and ensuring the proper communications equipment is available to support the Userinstalled equipment and configuration documentation. The User's equipment must meet 45 SW standards and policies concerning human and equipment safety, fire protection/suppression, protection from Radio Frequency (RF) emanations, power isolation/fusing, surge protection and a properly maintained facility. The User's Automated Data Processing Equipment (ADPE) brought into or interfacing with any ERoperated facility must have a government-approved Security Plan and Risk Analysis accomplished prior to operating. The applicable government Designated Approving Authority (DAA) can approve/disapprove and certify the ADPE system. The Information Assurance Office (IAO) reserves the right to review all government DAA approvals/ disapprovals for ADPE brought into or interfacing with the ER. The User will ensure its operations comply with all precautions regarding the hazards of electromagnetic radiation to ordnance and its own operations do not pose a danger to other Users throughout the ER.

18

- (e) Provide 45 RMS any User-specific maintenance instructions and/or plans affecting operational ER support. The User will identify a communication maintenance POC for the verification and troubleshooting of mission circuits.
- (f) Comply with standard installation practices for any installation of commercial connectivity through the government infrastructure on the government's side of the demarcation point.
 - 1. Comply with the 45 SW's acceptance test requirements.
 - 2. Provide 45 RMS with installation technical data and documentation.
- <u>3</u>. Understand installed connectivity will become part of the range infrastructure and the 45 SW will assume configuration control. The 45 SW will not allocate or reassign connectivity allocated to the User to other range users.
- <u>4</u>. Understand connectivity is allocated for the User's missions only and the User will not sell excess capability to other commercial ventures.
- <u>5</u>. Understand the 45 SW reserves the right to interrupt service or reassign connectivity in cases of national emergency.
- (g) Obtain permission from the 45 SW Frequency Management Office (FMO) and 45 SW Emissions Security Office to operate any RF devices (excluding cellular phones and pagers) or modify the approved RF emissions of any existing system. The User should provide all technical information required to obtain frequency use approvals/disapprovals at least 90 days before the first required use date.
- (h) Obtain and provide the FMO with FCC-issued licenses, as applicable, to operate on FCC controlled frequencies.

j. Security

(1) The 45 SW will:

- (a) Coordinate security support in accordance with DoD, AF, AFSPC & 45 SW policy and guidance for all expendable vehicle launches from CCAFS for areas outside the User's fenced launch complex.
- (b) Provide base access for the User's employees, contractors and customers, when requested, as stipulated in 45 SW-approved policies and procedures.
- (c) Assist in the development and review of all facility security plans and procedures. Coordinate on security plans and procedures.
- (d) Review and coordinate on new construction and modification plans as they apply to the User's security profile.

- (e) Monitor security operations as necessary to ensure compliance with established security regulations, including DoD 5220.22-M, *National Industrial Security Program Operating Manual* and the intent of AFI 31-series instructions.
- (f) Coordinate the investigation of all security incidents, violations and accidents involving Air Force, or third party resources or personnel on CCAFS.
- (g) Provide armed response forces as outlined in AFI 31-101 for protection of Protection Level-1 (PL-1) resources. Security Forces will operate the Electronic Security System in conjunction with User and respond to alarms generated by the system.
- (h) Coordinate and validate preventive and corrective action performed by base support contractors on the Electronic Security System at the PL-1 resources.
 - (2) The User will:
- (a) Coordinate security activities with 45th Security Forces Squadron (45 SFS).
 - (b) Comply with all security procedures and applicable directives.
- (c) Recognize the primary responsibility of 45 SFS for security outside the User's leased or licensed area, to include the User's licensed area inside a government facility. During critical launch operations, recognize that base security support will become the lead security response when conditions warrant.
- (d) Provide immediate notification to 45 SFS of any security violation, incident or accident.
- (e) Provide new construction and modification plans, as they apply to the User's security profile, to 45 SFS for review and coordination.

k. Logistics

(1) The 45 SW will:

- (a) Provide CCAFS critical spares/equipment support for ER systems supporting User launch operations (i.e. command destruct, telemetry, communications, radar, etc.)
- (b) Provide CCAFS aviation and ground fuel support for DoD aircraft, generators, organizational tanks, special purpose vehicles and vehicles in support of launch operations.

(a) Comply with AFMAN 23-110, AFI 23-201 and AFI 23-204, as supplemented by local and HQ AFSPC instructions/procedures to receive services.

I. Financial

(1) The 45 SW will:

- (a) Support User's requirements in accordance with 45 SWI 65-601, *Reimbursement Policy,* as necessary, for recurring fiscal cost estimates no later than 30 August of the current fiscal year and any identified task(s) intended to extend beyond the scope of the current fiscal/calendar year.
- (b) Produce certified bills for services provided to the User. DFAS will accomplish billings by monthly submission of Standard Form (SF) 1080, *Voucher for Transfers Between Appropriations and/or Funds*, for reimbursable costs. The 45 SW will provide the User detailed JON activity reports within 15 working days of the end of the billing month. Details will include dollars expended, organization, Responsibility Center/Cost Center (RC/CC), Element of Expense Investment Code (EEIC) and JON.

(2) The User will:

- (a) Reimburse the 45 SW in accordance with the *Commercial Space Launch Act (CSLA)* and any amendments thereto, DoD implementing instructions, applicable Air Force instructions and 45 SW Comptroller financial policy interpretations.
 - (b) Provide up-front funding prior to work being performed.

m. International Affairs

- (1) 45 SW/XPI will provide support for treaties and international agreement compliance, including assistance with international inspections and required reporting.
- (2) The User will comply with the requirements of all treaties and international agreements to which the United States is a party.
- (3) The User will submit requests to the 45 SW Foreign Disclosure Office (45 SW/FDO) for all foreign visitor access to any 45 SW facility, including CCAFS.
- (4) The 45 SW/FDO will process foreign visitor requests for approval/disapproval and provide foreign access policy guidance.
- (5) The 45 SW/FDO will provide foreign escort training which is required for all personnel escorting foreign nationals.

n. Antiterrorism

(1) The 45 SW will:

- (a) 45 SW shall provide guidance and assistance to the User in developing and implementing the DoD and 45 SW Antiterrorism (AT) Program IAW applicable directives. Some of those directives are HSPD-12, DoDD 2000.12, DoDI 2000.16, DoD O-2000.12-H, AFI 10-245, AFSPC Sup to AFI 10-245, 45 SW AT Plan 10-245 and 45 SW Sup to AFI 10-245.
- (b) 45 SW will review all new construction and facility upgrades to User facilities on CCAFS and off-base areas under the jurisdiction of the Air Force to ensure compliance with current AT construction standards as defined from the Unified Facility Criteria (UFC), such as UFCs 4-010-01, 4-010-02, and 4-021-01.
- (c) During the evaluation process for future User contracts, leases or licenses, the 45 SW may consider whether the User's prior compliance with AT measures and requirements were satisfactory.

- (a) The User shall establish and maintain an AT program, IAW DoD, AF, and 45 SW guidelines (as listed in 2.a. and 2.b. above), that promotes an understanding of AT among all user employees on CCAFS and off-base areas under the jurisdiction of the AF.
- (b) The User's AT program shall be closely coordinated with the 45 SW AT Officer to ensure that all aspects of DoD space launch operations and assets (DoD & commercial) supporting Federal or National Security Missions are protected.
- (c) The User will assign a Primary and Alternate representative via appointment letter to liaison with the 45 SW AT Officer. It is highly recommended that these representatives attend locally-sponsored AT Level II courses to acquire formal certification. It is a requirement for any organization over 100 people to have Level II training within 60 days.
- (d) The User shall comply with any government AT requirements levied upon them through aforementioned AT publications, government contracts or this agreement.
- (e) The User shall interface and coordinate with 45 SW AT Officer and other wing security specialists to successfully meet the required objectives of the program.
- (f) The User will encourage all employees working on CCAFS or off-base areas under the jurisdiction of the AF to be trained annually to help prevent, detect, deter, defend and report acts of terrorism. As a military installation, CCAFS is at a

higher risk to acts of terrorism and User employees should be trained about those risks. Training shall be an approved DoD AT Level I training. Training statistics (number of personnel assigned and current on annual training) will be provided to the 45 SW AT Officer quarterly. Level I and II AT training can be conducted by someone who is Level II certified. Users will benefit from having their primary and alternate unit AT Officers trained in Level II and those persons can conduct the initial Level I training. Level I training can be conducted via the computer based training course at: https://atlevel1.dtic.mil/at, or by a Level II trained person.

- (g) The User is responsible for providing their personnel information on the 45 SW AT Program.
- 1. During performance of work, personnel security and protection of resources is critical for the installation to maintain a safe work environment. The User will comply with the Eagle Eyes Program and be alert for and report any suspicious activity observed by their work force or any personnel working on the installation. If any situation appears to be suspicious, immediate actions must be taken to make proper notification to CCAFS Law Enforcement by calling 853-2121 or to the Patrick Emergency Control Center at 494-2008.
- 2. User personnel will be familiar with Force Protection Conditions (FPCONs). These measures are implemented to increase the security posture of the installation and protect personnel/property. A description of these measures and how to report or respond to suspicious activities or packages is included in the 45 SW AT (SWAT) Guide or as provided by the 45 SW AT Officer.
- 3. User will identify mission essential personnel in order to determine which personnel will report for work during higher FPCONs that require reduced work force attendance due to threats and risks to personnel.
- (h) The User shall implement a Random Antiterrorism Measure (RAM) Program for surveillance and protection of infrastructure and personnel consistent with the base program and approved by the 45 SW AT Officer. Document results of RAMs and make them available as required by written notice from the 45 SW AT Officer. RAM documents will be maintained for 24 months.
- 1. The User shall initiate actions directed by the installation commander during changes to Real World FPCONs to increase surveillance and protection of infrastructure and personnel. User will participate in wing AT exercises.
- (i) The User will participate in the Threat Working Group (TWG), Antiterrorism Working Group (ATWG) and the Antiterrorism Executive Committee (ATEC) as requested or directed by these AT bodies. These AT bodies address and mitigate threats to assets on AF property.
- (j) The User will participate in local or higher headquarter exercises as requested to the extent such participation does not interfere with accomplishment of its

contractual obligations or participation has been expressly denied by a contracting officer or has been formally approved for exemption by the 45 SW/IGI. The government and 45 SW shall not be held liable for short periods of work stoppage.

- (k) The User will not inhibit emergency response forces while in the performance of their duties during real world or exercise situations.
- (I) During advanced readiness postures or FPCONs, User personnel may be prohibited from certain portions of the installation based on security or mission needs. The government and 45 SW shall not be held liable for short periods of work stoppage in the name of National Security.
- 1. User services and installation access may be curtailed, closed or more closely supervised. This will require the User to identify emergency essential and mission essential personnel. These personnel will be identifiable per 45 SW-defined criteria, e.g. ID badges, Entry Access List, etc.
- 2. All personnel are subject to "on-the-spot" searches by the military police or personnel tasked with facility entry control duties. Searching of automobiles or persons should not be considered as a personal affront or indicative of suspicion. Spotchecking is an established policy for personnel security.
- 3. Facility stand-off barriers will not be circumvented by vehicles owned/operated by User personnel.
- (m) The User will ensure all new construction and facility upgrades to facilities on CCAFS and off-base areas under AF jurisdiction are coordinated through the 45 CES-trained Security Engineer (usually the assigned 45 CES Antiterrorism Monitor) and through the 45 SW AT Officer to ensure compliance with current AT construction standards. The User will adhere to the DoD Unified Facilities Construction Code Requirements and interpretations of the 45 SW AT Officer.
- (n) The 45 SW may require some or all of the following AT documentation from the User:
 - 1. User specific AT Plan IAW 45 SW Plan 10-245.
- 2. User specific Force Protection Checklist (checklist subset of 45 SW checklist).
- 3. User specific Facility Security Plan as defined by the 45 SW AT Plan.
 - o. Weather
 - (1) The 45 SW will:

- (a) Provide system and mission constraint evaluation and weather forecasting services in support of user launch/test operations for determination of acceptable meteorological conditions.
- (b) Define and provide details of weather support roles at CCAFS and AFSPC's ER IAW 45 SWI 15-101.
- 1. The 45 WS supports all space and ballistic missile launches at CCAFS and the ER through the generation, execution, and recovery phases per the UDS Operations Directive. 45 WS Launch Weather Officers work closely with each launch agency to establish and sustain weather support requirements.
- 2. The 45 WS provides 24-hour meteorological watch as required to include forecasts, observations, watches, warnings and advisories to enhance base resource protection.

3. Weather Data and Instrumentation:

- a) Upper Air: The ER provides high-resolution and low-resolution balloon data. A team, currently a contract entity, monitors and quality controls the incoming data and provides standard data items for the 45 SW Safety Office and the launch agency.
- b) Airfield Observations: The 45 WS provides surface weather observations using an automated system for the CCAFS Skid Strip (KXMR).
- c) Meteorological Instrumentation: The ER has a vast meteorological information system comprised of sensors on towers of varying height, data networks, surface electric field mills, lightning surveillance systems and wind profilers. The 45 WS can provide after-the-fact lightning data to assist launch agencies with lightning mitigation efforts and to help program engineers determine if a lightning strike potentially caused damage to launch systems or ground support equipment.

(2) The User will:

(a) Coordinate and document all meteorological and environmental requirements and constraints using the UDS process.

p. Other

(1) Whenever possible, the 45 SW will provide the User access to or copies of compliance documents, Special Instructions, Military Standards, etc., required to operate on the ER and not otherwise available to the User. If the document itself is not releasable, for whatever reason, the 45 SW will provide written guidance to the User on how to comply.

3. Document Administration

4. Annex A Approval

- a. The 45 SW/XP is responsible for administrative management of this annex. This office will coordinate reviews/revisions, obtain signatures and distribute as required. This annex shall enter into force and effect upon final signature.
- b. The 45 SW may require an updated annex whenever a new CSOSA is signed or when significant policy changes have developed to warrant a reissue. The 45 SW and User may make changes at any time, witnessed by signature, to show mutual agreement. The 45 SW and User shall note and initial changes on the existing document or address changes in a signed memorandum that will become an official attachment to the existing annex. The 45 SW will incorporate minor changes, such as changes in names, addresses, office symbols, telephones numbers, etc., during the triennial review cycle.
- c. This annex may be terminated by either party with 180-days written notification to the other party. This annex is considered terminated upon completion of the User's commercial space launch-related activities at the ER.

Brigadier General, USAF

Commander, 45th Space Wing

XXXXXXXX	XXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXX

Date: Date:

Abbreviation & Acronym List

1 ROPS	1st Range Operations Squadron
45 CES	45th Civil Engineer Squadron
45 CES/CED	45th Explosive Ordnance Disposal
45 CES/CEF	45th Space Wing Fire Department
45 CES/CEA	45th Space Wing Environmental Office
45 CPTS	45th Comptroller Squadron
45 LCG	45th Launch Group
45 LCSS	45th Launch Support Squadron
45 OG	45th Operations Group
45 RMS	45th Range Management Squadron
45 SFS	45th Security Forces Squadron
45 SFS/S6	45th Security Forces Squadron, Range Security
45 SW	45th Space Wing
45 SWI	45th Space Wing Instruction
45 SW/FDO	45th Space Wing Foreign Disclosure Office
45 SW/CC	45th Space Wing Commander
45 SW/SE	45th Space Wing Safety
45 SW/SEA	45th Space Wing Safety Analysis Office
45 SW/XPI	45th Space Wing Agreements and Plans Office
45 SW/XPR	45th Space Wing Program Requirements Office
45 WS	45th Weather Squadron
ADPE	Automated Data Processing Equipment
AF	Air Force
AFB	Air Force Base
AFI	Air Force Instruction
AFMAN	Air Force Manual
AFSPC	Air Force Space Command
AFSPCI	Air Force Space Command Instruction
AFSPCMAN	Air Force Space Command Manual
AT	Antiterrorism
ATEC	Antiterrorism Executive Committee
ATWG	Antiterrorism Working Group
C4	Command, Control, Communications and Computer
CCAFS	Cape Canaveral Air Force Station
CEMP	Comprehensive Emergency Management Plan
CFR	Code of Federal Regulation
COLA	Collision Avoidance
CSA	Courtesy Storage Agreement
CSLA	Commercial Space Launch Act
CSOSA	Commercial Space Operations Support Agreement
DAA	Designated Approving Authority
DFAS	Defense Finance and Accounting Services
DoD	Department of Defense

DoT	Department of Transportation
EBS	Environmental Baseline Survey
ECS	Environmental Close-Out Survey
EEIC	Element of Expense Investment Code
EIAP	Environmental Impact Analysis Process
EOD	Explosive Ordnance Disposal
EPA	Environmental Protection Agency
ER	Eastern Range
ERTS	Eastern Range Technical Services
ESP	Explosive Site Plan
EWR	Eastern Western Range
FAA	Federal Aviation Administration
FAR	Federal Acquisition Regulation
FCC	Federal Communications Commission
FMO	Frequency Management Office
FPCON	Force Protection Conditions
FSS	Flight Safety System
GSE	Ground Support Equipment
IAO	Information Assurance Office
IAW	In Accordance With
ICD	Interface Control Document
JOA	Joint Operating Agreement
JOM	Job Order Manager
JON	Job Order Number
KMI	Knowledge Management Initiative
KSC	Kennedy Space Center
LCG	Launch Group
LCSS	Launch Support Squadron
LSIM	Launch Site Integration Manager
LV	Launch Vehicle
MFCO	Mission Flight Control Officer
MIL-STD	Military Standard
MSA	Munition Storage Area
NASA	National Aeronautics and Space Administration
NEPA	National Environmental Policy Act
O&M	Operations and Maintenance
OPLAN	Operation Plan
OSHA	Occupational Safety and Health Administration
PAFB	Patrick Air Force Base
PI	Program Introduction
PL-1	Protection Level-1
POC	Point of Contact
PPR	Prior Permission Required
PRD	Program Requirements Document
PSM	Program Support Manager

PWRR	Project Workflow Requirements Resource Manager
PWS	Performance Work Statement
RAM	Random Antiterrorism Measure
RCC	Range Commander's Council
RC/CC	Responsibility Center/Cost Center
RCEI	Range Communications-Electronics Instructions
RCO	Range Control Officer
RF	Radio Frequency
RI	Receiving Inspection
ROM	Rough Order of Magnitude
RPIE	Real Property Installed Equipment
RPO	Radiation Protection Officer
RUA	Radiation Use Authorization
SAF	Secretary of the Air Force
SC	Statement of Capability
SF	Standard Form
STD	Standard
SV	Space vehicle
SWAT	Space Wing Antiterrorism
SWI	Space Wing Instruction
(T)	Tailored
TO	Technical Order
TWG	Threat Working Group
UDS	Universal Documentation System
UN	United Nations
US	United States
USAF	United States Air Force
WPE	Wing Planning Engineer